Goal 3: Ensure healthy lives and promote well-being for all at all ages

Target 3.1: By 2030, reduce the global maternal mortality ratio to less than 70 per 100,000 live births

Indicator 3.1.2: Proportion of births attended by skilled health personnel

Institutional information

Organization(s):

United Nations Children's Fund (UNICEF) and World Health Organization (WHO)

Concepts and definitions

Definition:

Percentage of births attended by skilled health personnel (generally doctors, nurses or midwives) is the percentage of childbirths attended by professional health personnel. According to the revised definition[1] these are competent maternal and newborn health (MNH) professionals educated, trained and regulated to national and international standards. They are competent to: (i) provide and promote evidence-based, human-rights based, quality, socio-culturally sensitive and dignified care to women and newborns; (ii) facilitate physiological processes during labour and delivery to ensure a clean and positive childbirth experience; and (iii) identify and manage or refer women and/or newborns with complications. Traditional birth attendants, even if they receive a short training course, are not included.

1 Definition of skilled health personnel providing care during childbirth: the 2018 joint statement by WHO, UNFPA, UNICEF, ICM, ICN, FIGO and IPA available at https://data.unicef.org/resources/definition-of-skilled-health-personnel-providing-care-during-childbirth/ ↑

Rationale:

Having a skilled attendant at the time of childbirth is an important lifesaving intervention for both women and babies. Not having access to this key assistance is detrimental to women's health because it could cause the death of the women or long lasting morbidity, especially in vulnerable settings.

Methodology

Computation method:

The number of women aged 15-49 with a live birth attended by a skilled health personnel (e.g. doctors, nurses or midwives) during delivery is expressed as a percentage of women aged 15-49 with

a live birth in the same period.

Treatment of missing values:

- ***At country level:***

There is no treatment of missing values at country level. If value is missing for a given year, then there is no reporting of that value.

- ***At regional and global levels:***

Missing values are not imputed for regional and global levels. The latest available year within each period is used for the calculation of regional and global average.

Regional aggregates:

Regional and global estimates are calculated using weighed averages. Annual number of births from United Nations Population Division, World Population Prospects[2] is used is as a weighing indicator. Regional values are calculated for a reference year, including a range of 4-5 years for each reference year. For example, for 2019, the latest year available for the period 2014--2019 was used.

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2 United Nations, Department of Economic and Social Affairs, Population Division, World Population Prospects. ↑

Sources of discrepancies:

Discrepancies are possible if there are national figures compiled at the health facility level. These would differ from the global figures, which are typically based on survey data collected at the household level.

In terms of survey data, some survey reports may present a total percentage of births attended by a skilled health professional that does not conform to the SDG definition (e.g., total includes provider that is not considered skilled, such as a community health worker). In that case, the percentage delivered by a physician, nurse, or a midwife are totaled, consulted with the country and included in the global database as the SDG estimate.

In some countries where the indicator on skilled attendant at birth is not actively reported, birth in a health facility (institutional births) is used as a proxy indicator. This is frequent countries in the Latin America region or in European and Central Asian regions, where the proportion of institutional births is very high.

Nonetheless, it should be noted that institutional births may underestimate the percentage of births with skilled attendant.

Methods and guidance available to countries for the compilation of the data at the national level:

UNICEF and WHO maintain a joint databases on skilled attendance at childbirth (doctor, nurse or midwife or any additional qualified category) and both collaborate to ensure the consistency of data sources. These surveys include Demographic and Health Surveys (DHS), Multiple Indicator Cluster Surveys (MICS), Reproductive Health Surveys (RHS) and national surveys based on similar

methodologies. The surveys are undertaken every 3 to 5 years. For some countries, for example in high-income regions (where the coverage is high), data sources include routine service statistics.

Before acceptance into the joint global databases, UNICEF and WHO undergo a country consultation that consists of an updating and verification process that includes correspondence with field offices to clarify any questions regarding estimates. During this process, the national categories of skilled health personnel are verified, and so the estimates for some countries may include additional categories of trained personnel beyond doctors, nurses, and midwives.

Quality assurance:

Data are reported to UNICEF on an annual basis. Values are reviewed and assess to make sure that reported indicator complies with standard definition and methodology.

As part of the country consultation, data are reported by UNICEF country office or statistical offices in country to UNICEF-HQ for global compilation. At the national levels, country offices are in touch with national authorities to compile and provide requested data, and therefore, values reported in global database are validated by national authorities.

Data sources

Description:

National-level household surveys are the main data sources used to collect data for skilled health personnel SBA. These surveys include Demographic and Health Surveys (DHS), Multiple Indicator Cluster Surveys (MICS), Reproductive Health Surveys (RHS) and national surveys based on similar methodologies. The surveys are undertaken every 3 to 5 years. For mainly industrialized countries (where the coverage is high), data sources include routine service statistics.

Collection process:

UNICEF and WHO maintain joint databases on skilled attendance at delivery (e.g. doctor, nurse or midwife or any additional qualified category) and both collaborate to ensure the consistency of data sources. These surveys include Demographic and Health Surveys (DHS), Multiple Indicator Cluster Surveys (MICS), Reproductive Health Surveys (RHS) and national surveys based on similar methodologies. The surveys are undertaken every 3 to 5 years. For mainly industrialized countries (where the coverage is high), data sources include routine service statistics.

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Data availability

Description:

Data are available for over 170 countries.

The lag between the reference year and actual production of data series depends on the availability of the household survey for each country.

Time series:

1990-2019

Disaggregation:

For this indicator, when data are reported from household surveys, disaggregation is available for various socio-economic characteristics including residence (urban/rural), household wealth (quintiles), education level of the mother, maternal age, geographic regions. When data are reported from administrative sources, disaggregation is more limited and tend to include only residence.

Calendar

Data collection:

As the main source of data is household surveys which are conducted every 3-5 years, the collection of data are under this schedule. When data comes from administrative source, data can be available on an annual basis.

Data release:

Estimates are published annually, in May by WHO in World Health Statistics (http://www.who.int/whosis/whostat/en/) and by UNICEF in State of the World's Children, and are available at www.data.unicef.org

Data providers

Ministries of Health and National Statistical Offices, either through household surveys or routine sources.

Data compilers

United Nations Children's Fund (UNICEF), World Health Organization (WHO)

References

URL:

https://data.unicef.org/topic/maternal-health/delivery-care/#

References:

Joint UNICEF/WHO database 2020 of skilled health personnel, based on population-based national household survey data and routine health systems.